REMARKS/ARGUMENTS

The above-identified application has been amended in that, without prejudice, clams 1 to 13, 17, 26 to 29, 32, 35, 37 and 38 have been cancelled and claims 16, 20-22, 24, 25, 31, 33, 34 and 36 have been amended. New claims 41 to 50 have been introduced into the application. The newly introduced claims are based on previous claims or are introduced in response to the Official Action to place the claims in a form more consistent with U.S. practice. Since the number of claims now pending is less than that previously paid for, no additional fee is due.

Examiners Richter and Gollamudi are thanked for the courtesy of the telephone interview of May 18, 2006. Where appropriate, the interview will be referred to in the following Remarks.

Claims 1, 3, 27, 31, 34 and 36 were objected to because of informalities. In response thereto, Applicant has amended a number of claims to correct spelling and typographical errors. Further, additional dependent claims have been introduced to claim narrower ranges recited in certain of the objected to claims.

Claims 1 to 13 and 15 to 40 have been rejected under 35 U.S.C. §112, second paragraph. It is submitted that this rejection is no longer proper. Claims 1 to 13, 17, 26 to 29, 32, 35, 37 and 38 have been cancelled without prejudice and a number of the remaining claims have been amended to replace the objected to language.

Since claims 1 and 35 have been cancelled, the rejection of these and still pending claims based on the use of "consisting essentially of" is now moot.

Claims 4, 5, and 8 to 10 have been cancelled without prejudice so that the Section 112 rejections directed to those claims is now also moot.

Claim 17 was also cancelled and has been replaced by new claim 46. Claim 46 does not include the objected to phraseology and includes a number of corrections as to form.

Claims 16, 21 and 22 have been amended to recite the compound name followed by abbreviation. However, it is submitted that one of ordinary skill in the art would have no problem understanding the abbreviations since they are commonly used by those in the art. However, Applicant has complied with the Examiner's suggestion.

Claim 32 has been cancelled but replaced by claim 49 wherein the name of the compound is included as well as, where appreciate, the abbreviation.

The Examiner states that "substantially non-porous" is vague and indefinite. However, the prior Examiner had raised this issue during a telephone interview on November 6, 2003. The issue was addressed in the Amendment After Final Rejection filed on December 12, 2003. (See pages 17-18 thereof). Further, one of ordinary skill in the art would certainly understand this term based on the specification. Any rejection under Section 112 requires that the specification also be considered. See *Ex parte Wolters et al.*, 214 USPQ 735 (POBA 1979) and *Ex parte Calhoun et al.*, 195 USPQ 455 (POBA 1976).

It is thus submitted that the Section 112 rejections are either improper, moot or have been overcome.

The invention defined by the now pending claims is for a process of producing a pharmaceutical preparation of an active ingredient which is a proton pump inhibitor and of the class of compounds known as substituted benzimidazoles. Such compounds are known to be acid labile and degrade rapidly when exposed to an acidic environment. When such compounds exposed to the gastric environment, they can degrade within the stomach. This is not desirable. Enteric coatings, used to protect a dosage form from stomach acid, are also acidic thus causing premature degradation of the benzimidazole. Another technique, to include an alkaline substance with the active ingredient, caused the enteric coating to break down thus exposing the active ingredient to stomach

acid thus causing rapid degradation of the active ingredient. Lovgren proposed the solution of including a separating layer to separate the active ingredient and alkaline material from the enteric coating. See U.S. Patent Nos. 4,786,505 and 4,853,230 to Lovgren et al.

THE ART REJECTIONS

1. Anticipation

Claims 1 to 13, 26 to 26, 35, 37 and 38 were rejected under 35 U.S.C. §102(e) as anticipated by U.S. Patent No. 6,132,771 to Depui et al. (Depui '771). It is submitted this rejection was improper and is now moot.

This anticipation rejection is directed to claims which have now been cancelled from this application. Accordingly, this rejection is presently moot and need not be responded to. Applicant reserves the right to refer to previous responses to the extent the Examiner relies on any part of this rejection with respect to any of the claims remaining in this application. Applicant also traverses the Examiner's response including her comments on the submitted declarations. However, it should be noted it is difficult to tell from the wording of the Office Action what, if any, of the comments set forth with respect to the above rejection are being relied upon with respect to other rejections.

Applicant also takes issue with the Examiner's reliance on inherency. Inherency can only be invoked when an event or condition <u>must result</u> not when it <u>may</u> result. There is nothing in the record that provides a basis for reliance on inherency for any purpose.

Further, reliance on dictionary definitions is not favored. See *Phillips v. AWH Corp.*, 75 USPQ 2d 1321 (Fed. Cir. 2005). The decision of *In re Petering* in not applicable in this instance. *Petering* did not involve an issue of enablement where prior art showed a lack of enablement as to the cited subject matter of the reference. Additionally, it is improper for an Examiner to consider a discussion of a prior art disclosure to be an admission by Applicant. Also characterizing a

declaration as "nonpersuasive" without responding to the merits of the declaration is essentially ignoring the declaration. The Office Action comments regarding the Johansson Declaration are confusing and appear to begin with the unsubstantiated premise that the Depui's active layer is substantially not porous. Since Depui never makes any such statement, compliance with 37 CFR 1.104(d)(2) is requested. Also, the Examiner's discussion in the first full paragraph on page 15 suggests that there continues to be a misunderstanding of the claimed invention and submitted arguments.

Claims 1 to 13 and 15 to 40 were rejected under 35 U.S.C. §102(e) as anticipated by U.S. Patent No. 6,365,184 to Depui et al. (Depui '184). It is submitted that this rejection is also improper and should be withdrawn.

Initially, it is noted that although this rejection includes those claims drawn to a process, the rejection explanation is worded as if it were limited to the product claims which have now been cancelled without prejudice. Accordingly, Applicant now addresses the rejections to the extent it encompasses the process claims which remain in the application.

It is submitted that the rejection fails to establish a case of anticipation with respect to the subject matter claimed in pending claims 15, 16, 18 to 25, 30 31, 33, 34, 36 and 39 to 50. The reference does not describe or enable the claimed invention defined in any of those claims. See Applicant's Response of August 30, 2005 at pages 3 to 8.

The disclosure of the '184 patent has been discussed extensively in prior responses and those comments are incorporated by reference as if set forth here at length. Neither Depui '184 nor '771 is focused on process technology and what information is provided regarding the reference process is general at best.

With respect to process considerations, it appears the Examiner's only comment is in reference to example 4 of the '184 patent. However, neither that example nor any other disclosure in the '184 patent anticipates the now claimed subject matter defined in the pending process claims. Presumably, the Examiner considers example 4 to present her best case for anticipation based on this reference. However, whether example 4 represents the Examiner's best case or not, the reference does not anticipate the now claimed subject matter. It is clear from the wording of example 4 that there are at least two separate operational apparatus employed. Further, it is also clear that in example 4 there is a separating layer applied on to the suspension layered core. Subsequently, an enteric coating is applied on the separating layer. This is in direct contrast to the claim language wherein the enteric coating solution is sprayed to form a gastro-resistant external coating layer on the charged nucleus.

It is clear from the disclosure of the '184 patent that the problems which that reference seeks to address in both the product and process for making that product are those which arise in a single fixed unit dosage form containing multiple active substances that have different physical, chemical and pharmacological properties. According to the reference, preparation of multiple unit dosage forms give rise to specific problems not encountered in a single active dosage form. See col. 2, ll. 52 to 63.

The Office Action explanation of the anticipation rejection refers to the "consisting essentially of" language and cites to the Section 112, second paragraph, rejection which presumably is that appearing near the bottom of page 3 of the Office Action. During the above referenced telephone interview, the Examiners agreed that cancellation of claim 35 would overcome that particular rejection. Claim 35 has now been cancelled and there is no present pending claim that

contains the same recitation as did claim 35. Accordingly, neither claim 35 nor that rejection should be relied on directly or indirectly for any purpose.

In responding to the previously submitted arguments, the Examiner states that because claims 34 and 36 recite "comprising language" it is not exclusionary. However, the wording of the claims clearly indicate a separating layer is excluded.

Also, it is clear from the citations relied upon by the Examiner that she is engaging in claim construction. For purposes of examination, the Examiner is only permitted to interpret the claims as broadly as is reasonably supported by the <u>specification</u>. There is no mention in the specification of a second active ingredient being present. Thus, the Examiner has engaged in an interpretation of a claim beyond that which is permitted. Further, neither *PPG* nor *AK Steel Corp*. have any relevance to the present issues. Both cases involved an extensive analysis of the specification of each of the patents there at issue as well as extrinsic evidence. The Examiner has not set forth any such analysis here.

Further, the Office Action, at page 18, appears to either confuse or improperly intermingle the concept of showing "unexpectedness" (which presumably is a shorthand reference to unexpected results or benefits) and enablement. While certainly enablement is required for a reference to anticipate, the Examiner cannot dismiss or fail to address the merits of a 132 Declaration that shows unexpected benefits based solely on a Section 102 rejection when, the Examiner has also issued a Section 103 rejection. Nor can the Examiner dismiss the declaration which shows lack of enablement of the prior art by referring to issues regarding unexpected results.

On page 19 of the Office Action, the Examiner attempts to rewrite example 4 of the reference to contain disclosure to support her position. However, the PTO cannot rewrite the prior art. See *In re Hummer*, 113 USPQ 66, 69 (CCPA 1957). It is clear from example 4 that there are at

least two separate coating apparatuses which are used in that example. It is also clear from that example that the coating containing the active ingredients is performed in a different apparatus. Further, the Examiner's rationale that claims with open-ended language, which do not specifically exclude a reference disclosure can be rejected as including those limitations, is improper. The wording of the process claims would make the other steps cited by the Examiner redundant.

2. Obviousness

Claims 1 to 13, 26 to 29, 35, 37 and 38 were rejected under 35 U.S.C. §103(a) as unpatentable over U.S. Patent No. 6,132,771 to Depui. It is submitted that this rejection is improper and should be withdrawn.

The claims are directed to the product and those claims have been cancelled. Further, see Applicant's above comments with respect to the rejection of those claims as anticipated based on the '771 patent.

Applicant incorporates by reference the previous discussions and comments in this and prior submissions with respect to Depui's '771 patent.

The Office Action indicates that Depui "states" that the formulation does not necessarily include a spacing layer between the coated seed and enteric coating. Applicant disputes this. There is never a positive statement by Depui that the spacing layer or separating layer is not necessary or when it may be necessary. Further, Applicant disputes that the reference provides two embodiments because, as previously pointed out, there is no enablement of the embodiment without a separating layer. Nor does the Examiner's citation to col. 9, ll. 46 to 54; col. 10, ll. 41 to 43, disclose the use of a fluidized bed apparatus for coating.

Applicant takes issue with the Examiner's conclusion that because the reference uses the word "optional" that it is implicit that the formulation can function stably without the separating

layer. This is not the scientific fact nor is it a justifiable inference from the disclosure. The Examiner is attempting to apply "inherency" in the context of a Section 103 rejection. This is contrary to the law.

In the response to the previously submitted arguments, the Examiner continues to maintain that because the obviousness rejection does not incorporate Lovgren, that the information in Lovgren which plainly contradicts many of the Examiner's assumptions and assertions need not be considered. This is tantamount to submitted evidence being ignored. However, the Federal Circuit has made clear that such evidence must be considered. *See In re Piaseki*, 223 USPQ 785 (Fed. Cir. 1984). Also note that Section 103 requires the art be considered as a whole. Further, in connection with the Section 103 rejection, the Examiner has ignored the previously submitted declarations. While the Examiner "mentioned" at least one of the declarations in the discussion of the anticipation rejection, as is pointed out above, the Examiner appears to have dismissed or not considered that declaration on an erroneous basis. In any event, since the declaration was submitted with respect to not only the anticipation but the obviousness rejection, it should be addressed separately in connection with the obviousness issues.

It is noted that the Examiner has withdrawn the obviousness rejection of the process claims based on the Depui '771 patent alone.

Claims 15 to 25, 31 to 34, 36, 39 and 40 have been rejected under 35 U.S.C. §103(a) as unpatentable over Depui '771 in view of U.S. Patent No. 4,017,647 (Ohno) or U.S. Patent No. 2,799,241 to Wurster. It is submitted this rejection is also improper and should be withdrawn.

The comments and criticisms of Depui '771 as a reference under Section 103 previously submitted are hereby incorporated by reference.

Depui, starting in col. 13, at about line 7, under the heading "Process" discusses her process for manufacture of the dosage forms discussed therein. In particular, Depui at col. 13, ll. 8 to 16, states as follows:

The process for the manufacture of the dosage form represents a further aspect of the invention. After formulation of the pellets by spraying coating or layering of the proton pump inhibitor onto seeds, or by extrusion/sphernization or granulation, e.g. rotor granulation of homogeneous pellets, the pellets are first optionally covered with the separating layer(s) and then with the enteric coating layer(s) or a separating layer spontaneously developed in situ between the alkaline core material and the enteric coating material. The coating is carried out as described above and in the accompanying examples.

There is not a single mention in this paragraph of a fluidized bed in connection with applying the active ingredient coating or the enteric coating. What <u>is</u> specifically mentioned is rotor granulation or extrusion/sphernization. As already established in the Molina Declaration, the use of rotor granulation produces an inferior and unacceptable product.

Further, it should be observed that not a single example contained in the cited reference shows an embodiment wherein the dosage form is produced without a separating layer. Thus, one of ordinary skill in the art would understand that the use of a separating layer is the preferred embodiment, and is the only actually enabled embodiment of the reference.

The presently pending claims clearly recite the presence of an alkaline reacting compound in the aqueous or hydroalcoholic suspension-solution which also contains the active ingredient. As established by the Johansson Declaration, repetition of example 5 of the Depui but without the separating layer results in an inferior product showing immediate degradation as is indicated by the brown color¹. Thus, the Examiner's previous position that one could simply follow the Depui

19

¹ In contrast, products made by the now claimed process have been approved by the regulatory authority of at least one European country which indicates the product has a suitable stability and product life.

examples but omit the separating layer has been shown to be in error. Further, as implicitly acknowledged by the Examiner, Depui does not disclose the use of a Wurster fluidized bed.

The Examiner cites Ohno as teaching a method for providing an enteric coating on solid dosage forms. The objective of the Ohno disclosure is to enteric coat a dosage form with an aqueous solution of a polymeric substance having carboxyl groups as a water soluble salt and contacting the coated dosage form with an inorganic acid to covert the polymer substance into the water insoluble acid form. As explained to the Examiners during the aforementioned interview, the Office Action misstates the disclosure of Ohno. The Examiner cites to col. 3, ll. 24 to 40, as support for her discussion of Ohno and its application as a reference. However, no where in the Ohno reference is there a disclosure that coating apparatus such as pan coaters, drum-type coaters, or Wurster-type fluidized coaters... are equivalent or the same or operate under the same principle. Rather, Ohno discloses that once someone selects a type of coating apparatus, one can use the same conditions of operation for that particular apparatus in applying an aqueous-based coating material as were used with that apparatus for applying an organic solvent based coating material. More specifically, Ohno states:

There is no difference in principle between the conditions with which the solid dosage forms are coated in accordance with the invention and those with which the aforementioned conventional coaters are operated using a coating solution with an organic solvent.

Thus, the very basis on which the Examiner relies for the citation or combination of Ohno in the rejection is in error. Ohno does not provide a broad teaching of equivalency or suggest that the results obtained by all coating apparatus are equivalent. The Examiner is not free to modify the disclosure so as to suggest that which the actual text does not, *In re Hummer, supra*. The

citation of Ohno highlights that the prior art did not appreciate the significance of the procedure by which the layer is applied. See *Ex parte Wisdom & Hilton*, 184 USPQ 822 (POBA, 1973).

The Office Action asserts that Wurster teaches that a Wurster-type fluidized apparatus provides a uniform coating preventing a coating material from sticking to the inner surface of the chamber.

Applicants do not deny that a Wurster-type fluidized apparatus was known. However, what is not disclosed or suggested in any of the references is that by utilizing this type of apparatus, one can obtain a substantially non-porous homogeneous soluble active layer which can eliminate the need for a separating layer in those types of formulations where the prior art required the presence of the separating layer to protect the active ingredient from the deleterious affects of enteric coatings. None of the cited art provides a disclosure or suggestion of such a feature or how to obtain it. See *Ex parte Wisdom & Hilton*, *supra*.

Further, the combination of references is not motivated by the art but is clearly the product of hindsight reconstruction.

On page 24, the Examiner responds to the previously submitted arguments regarding the obviousness rejection. It is submitted that the claims as now pending do exclude applying a separating layer. Further, there is no basis for the Examiner to believe that Depui's formula is stable. Such information cannot be assumed and if the Examiner has independent knowledge, it should be set forth on the record in compliance with the requirements of 37 CFR §1.104(d)(2).

The Examiner's reference to Ohno has been addressed above and in fact, the very text quoted from Ohno by the Examiner in the paragraph bridging pages 24 and 25 of the Office Action shows that Ohno teaches something different from what the Examiner has relied upon it for.

Claims 1 to 13, 26 to 29, 35, 37 and 38 have been rejected under 35 U.S.C. §103(a) as unpatentable over Depui '184. It is submitted this rejection is presently moot since those claims been cancelled without prejudice.

In view of the foregoing, reconsideration and allowance of the application with claims 15, 16, 18 to 25, 30, 31, 33, 34, 36 and 39 to 50 are earnestly solicited.

Also submitted herewith is an IDS identifying WO96/01624 ("WO '624"). According to German Patent Office Records, U.S. Patent No. 5,753,265 corresponds to this document. While the Examiner is invited to consider WO '624 in its entirety, attention is invited to Example 11. Example 11 uses a core composition according to Example 1 or Example 10 thereof. A comparison of 'WO '624's Example 1 composition and amounts of the core, separating layer and enteric coating layer to those of Example 5 of Depui '771, as set forth in the Johansson Declaration, shows that the compositions are substantially identical. Hence, what is believed to be the closest example from WO '624 has effectively been shown to result in a poor and unacceptable product when no separating layer is included. It should be noted that WO '624 is directed to a tablet form and on pages 28 and 29 additional components and processing are indicated. The comments made above with respect to the Depui references are equally applicable to WO '624.

It is believed that no fees or charges are required at this time in connection with the present application. However, if any fees or charges are required at this time, they may be charged to our Patent and Trademark Office Deposit Account No. 03-2412.

Respectfully submitted,

COHEN, PONTANI, LIEBERMAN & PAVANE

Reg. No. 26,879

551 Fifth Avenue, Suite 1210

New York, New York 10176

(212) 687-2770

Dated: June 6, 2006